



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/533,112	04/28/2005	Uwe Meisenburg	PAT-01092	4789
77224	7590	02/13/2009	EXAMINER	
Mary E. Golota Cantor Colburn LLP 201 W. Big Beaver Road Suite 1101 Troy, MI 48084			KATAKAM, SUDHAKAR	
			ART UNIT	PAPER NUMBER
			1621	
			NOTIFICATION DATE	
			02/13/2009	ELECTRONIC
			DELIVERY MODE	

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

MARJORIE.ELLIS@BASF.COM
Mgolota@CantorColburn.com
usptopatmail@cantorcolburn.com

Office Action Summary	Application No.	Applicant(s)	
	10/533,112	MEISENBURG ET AL.	
	Examiner	Art Unit	
	Sudhakar Katakam	1621	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) Responsive to communication(s) filed on 12 December 2008.
 2a) This action is **FINAL**. 2b) This action is non-final.
 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) Claim(s) 1-5, 7-10 and 13-23 is/are pending in the application.
 4a) Of the above claim(s) 8-10 is/are withdrawn from consideration.
 5) Claim(s) _____ is/are allowed.
 6) Claim(s) 1-5, 7 and 13-23 is/are rejected.
 7) Claim(s) _____ is/are objected to.
 8) Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) The specification is objected to by the Examiner.
 10) The drawing(s) filed on _____ is/are: a) accepted or b) objected to by the Examiner.
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
 a) All b) Some * c) None of:
 1. Certified copies of the priority documents have been received.
 2. Certified copies of the priority documents have been received in Application No. _____.
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ . |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____. | 6) <input type="checkbox"/> Other: _____ . |

DETAILED ACTION

Status of the application

1. Receipt of Applicant's Remarks and Arguments filed on 12th Dec 2008 is acknowledged. However, the arguments for the previous rejection for the claims are not found persuasive and as such, the following rejection has been maintained.
2. Applicants' added the new claims 17-23.
3. The claims 1-5, 7-10 and 13-23 are pending.

Claim Rejections - 35 USC § 102

4. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

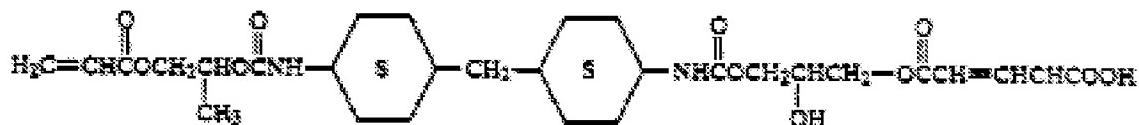
5. Claims 1-5, 7-10 and 13-22 are rejected under 35 U.S.C. 102(b) as being anticipated by **Hung et al** (US 4,849,321).

The instant claims are to a compound, which can be activated by actinic radiation, comprising at least one urethane group and having the formula:



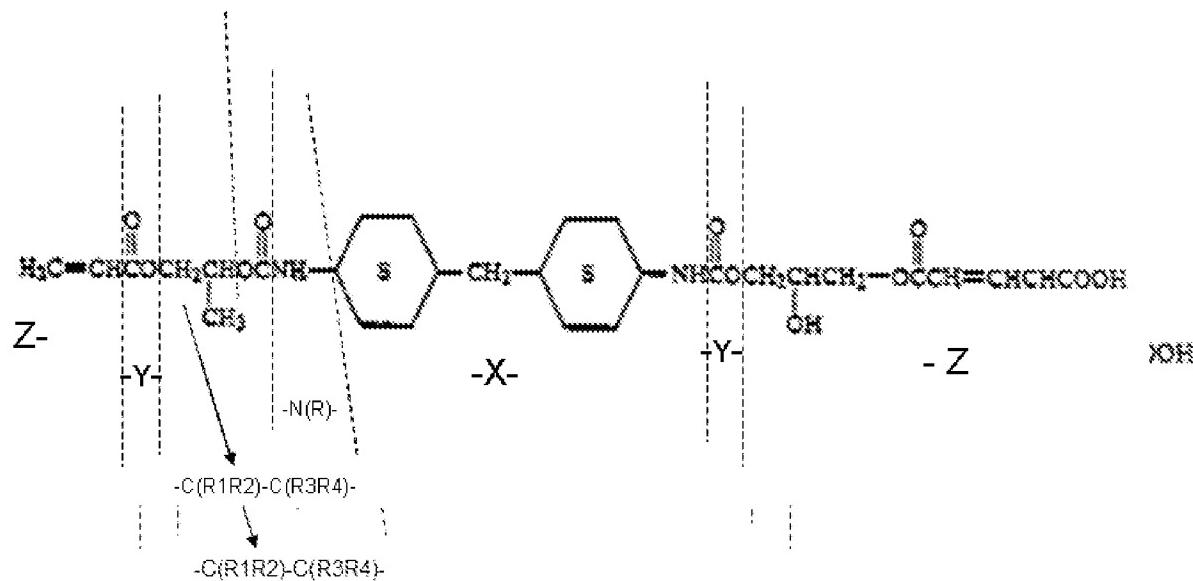
with the proviso that at least for n=1 the radical R and/or the radical X are/is substituted by at least one substituent of the general formula, represented by the group Z-Y-.

Hung et al disclose a UV curable following urethane compound and composition [col. 5, 6 and 13-14], which anticipates the instant claims:



With the applicants' proviso, the formula I can be represented by the following formula:

Z-Y-X-N(R)-C(O)-O-C(R₁R₂)-C(R₃R₄)-Y-Z, which is disclosed by **Hung et al** formula, and it can be illustrated by:



, which anticipates the instant claims. Thus, X is an at least n-valent substituted or unsubstituted organic radical, i.e. in this case aminocyclohexylmethylcyclohexane, and Z-Y- of formula II is attached as shown in the right hand portion of the structural formula given above, i.e. through the amino group of the aminocyclohexylmethylcyclohexane.

The claim 17 is inherent property of the **Hung et al**'s formula.

Claim Rejections - 35 USC § 103

6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

7. The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

8. Claim 23 is rejected under 35 U.S.C. 103(a) as being unpatentable over **Hung et al** (US 4,849,321).

Claims are further limited to the compounds, as recited in the claim.

Hung et al teach a UV curable urethane compound and composition [col. 5, 6 and 13-14], which make the instant claims obvious. **Hung et al** formula comprises of an organic radical, monovalent substituted or unsubstituted organic radical, a divalent linking functional group containing at least one oxygen atom, and an organic radical containing at least one group which can be activated by actinic radicals.

The difference between the instant claims and **Hung et al** is that various substitutions on the core structure.

However, the core structure of the compound is very well established by Hung et al. One skilled person in the art would be motivated to modify the known groups on the core moiety with a reasonable expectation of success. Furthermore a person of ordinary skill has good reason to pursue the known options within his or her technical grasp. If this leads to the anticipated success, it is likely the product not of innovation but of ordinary skill and common sense. Applicants are invited to provide a showing which is commensurate in scope with the claimed invention that clearly demonstrate that the claimed compounds result in some unexpected property over the prior art.

The claims would have been obvious because, a person of ordinary skill has a good reason to pursue the known options within his or her technical grasp. If this leads to the anticipated success, it is likely the product, not of innovation, but of ordinary skill and common sense.

The claim would have been obvious because the design incentives or market forces provided a reason to make an adaptation, and the invention resulted from application of the prior knowledge in a predictable manner.

All the claimed elements were known in the prior art and one skilled person in the art could have combined the elements as claimed by known methods with no change in their respective functions, and the combination would have yielded predictable results to have yielded predictable results to one of ordinary skill in the art at the time of the invention.

The Supreme Court in KSR noted that if the actual application of the technique would have been beyond the skill of one of ordinary skill in the art, then the resulting invention would have been obvious because one of ordinary skill could not have been expected to achieve it.

Therefore, it would have been obvious to a person of ordinary skill in the art at the time of the invention to use the teachings of Hung et al and known possible substitutions on the core moiety, to make the instant applicants compound and composition with a reasonable expectation of success. For the foregoing reasons the instant claims are made obvious.

Response to Arguments

9. Applicant's arguments filed on 12th Dec 2008 have been fully considered but they are not persuasive.

Applicants' argue that the amended claims are not anticipated by the Hung et al. The examiner does not find these arguments persuasive. The definition of X is broad and it can be amino substituted organic radical. Please see the above rejection for more details.

10. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within

TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Conclusion

11. No claim is allowed.
12. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Sudhakar Katakam whose telephone number is 571-272-9929. The examiner can normally be reached on M-F 8:30 AM - 5:00 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Daniel Sullivan can be reached on 571-272-0779. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a

Application/Control Number: 10/533,112
Art Unit: 1621

Page 8

USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Sudhakar Katakam/
Examiner, Art Unit 1621

/Peter G O'Sullivan/
Primary Examiner, Art Unit 1621